## ROUTING SYSTEM AND METHOD FOR TRANSPARENTLY RECOVERING ROUTING STATES AFTER A FAILOVER OR DURING A SOFTWARE UPGRADE

## **ABSTRACT**

Methods and apparatus for efficiently enabling routing states to be recovered after

a failover or during a software upgrade in a system which supports graceful restart and stateful switchover are disclosed. According to one aspect of the present invention, a method for restarting a network device which has a plurality of routers and is in communication with a first peer being arranged to support graceful restart and a second peer includes performing a graceful restart with respect to the first peer. A peer transparent failover is performed with respect to the second peer. The graceful restart and the peer transparent failover are performed in response to a failure associated with the network device.